EDITORIAL

The power of ideas: Can we love science and Jesus?

Growing up in New Mexico in the cottonwood *bosque* of the *Rio Grande* valley provided everything for a kid to become a biologist. I roamed along the river, cooked over cottonwood fires, ate wild asparagus, watched clouds form thunderheads over the distant peaks of the *Sangre de Cristo* (blood of Christ) mountains. Listening to the lazy buzz of bees around spicy purple sage, watching horned lizards lapping up red ants, smelling the fresh earth as rain quenched the alkali soil: learning to trust senses of smell, sight, touch and hearing – to never trust imaginings or emotions. Camping alone taught me that imaginings are a result of wild emotions. Demons in the night could easily be dismissed with your flashlight or a rifle shot. Emotions could be controlled; reason made wild imaginings disappear. Trusting the senses, and reason, made the world less fearful.

But by banishing demons, I no longer had need for angels. College furthered that conviction. The professors at university claimed that religious views were illogical emotion. But there was one significant philosophy mentor who pointed out that logic and rationality – those things I'd come to trust – were themselves not detectable by my senses. And yet they caused those "AHA . . . this is IT" moments. Logic and rationality somehow provided contentment and excitement, also feelings undetectable by the senses. What was going on in the brain to provide that pleasure? Are there more than just mere sensed physical things?

Such brain states are being understood today in light of emergent complexity theory. Biology and especially neuroscience are getting beyond the 'nothing buttery' physicalist explanations which claim that 'aha' insights are just electrochemical and neuro-enzymatic reactions. One complicated brain state can cause another. So it seems that brain states have within themselves causal efficacy. Phil Clayton summarizes emergent complexity as a multiple level empirical reality where the new emergent levels evolve into wholes that are more than the sum of their parts and which require new types of explanation adequate to describe their new types of causal interaction [1].

Despite the fact that everything in the universe is composed of physical matter and energy, it seems at least one of the universe's emergent composites, humans, is obsessed with a search for meaning. Using religious imagery, some humans experience moments of transcendence away from the very universe of their origin. Some see that universe as a product of cosmic order, perhaps even as a result of a purposeful agency that has a yearning for other minds to comprehend it. This cosmic agency seems to be more intelligent or conscious than we are. There are hints of this cosmic teleological agent in the physical world and in the inner brain activity of at least one species in it. Clayton asks, "Could not something of the divine be revealed by studying that animal that struggles with the question of God: ourselves?"

The religious response and search for transcendence is intrinsic to our existence. But are these experiences true? Is there any warrant for the hope of ultimate meaning that Clayton's emergent complexity hypothesis provides? Or is the universe pointless, absurd and meaningless? Clayton asks us to at least consider what it means for complex properties - like personhood or consciousness or the yearning for transcendence - to emerge. Certainly the methodological naturalism of science cannot adjudicate concepts like soul, supernatural entities, or explain divine action – assuming these exist. But it can admit that the human brain creates what each one of us considers ourselves to be: human persons with the ability to act in the world ... intentional agents with a sense of purpose and a yearning for transcendence. If we can go that far, what prevents us from admitting that the emergent conception of a higher agency than ourselves may also be true? We might first want to explore what qualities such an agency would have. It might be some natural force yet discovered. But if that agency stimulates human thoughts of the numinous, of spirituality, of transcendence . . . would it be unreasonable to expect it to have characteristics that are everything we are, but infinitely more? Clayton asks these questions and hypothesizes: if there are emergent properties of the human brain which manifest themselves in a personality or character that compose persons who act, then it also makes sense that the emergent spiritual properties conceived by that brain should be conceived as 'suprapersonal'. He therefore sees reasons to make the transition from finite agency to transcendent agency. And he does so, per Robert Boyle, without any incursion of that transcendent agency into the physical order - without physical miracles as traditionally conceived.

Is there a test of Clayton's hypothesis that can be conducted to determine its rationality? Science cannot test the existence of human thoughts, only their results when physically manifested. How might the emergent conception of a higher agency than ourselves be physically manifested? Clayton explores two possibilities: individual religious experience such as that found in mystics and the ideas proposed by what many consider to be divinely-inspired sacred scriptures of the world's religions. Despite the vagaries of human experience, one still has to admit the possibility that a self-revealing divine agent could be responsible for the inner mystical brain-states of humans as they experience the numinous. Describing the phenomena by brain scans does not define away the Divine. The scriptures claiming to record the self-revealion of God are more problematic with their apparent conflicts, redactions by the communities wherein they were once accepted, and incommensurability with later cultural and historical developments.

But perhaps a third possibility exists which *can* be directly measured: the production of virtue in the person with conceptions of a higher agency. According to one view of virtue epistemology (Montmarquet), epistemic conscientiousness is a key virtue wherein one needs to develop the regulative

virtues of impartiality (openness to other's ideas, the exchange of ideas, and a sense of one's own fallibility), intellectual sobriety (not jumping onto the bandwagon of the latest enthusiastic idea monger), and intellectual courage (a willingness to think otherwise with respect to popular ideas, perseverance in the face of opposition, and determination to see an inquiry through to the end). Put more simply by St. Paul, these are the fruits of the Spirit: love, joy, peace, patience, kindness, goodness, faithfulness, gentleness and self-control (Galatians 5.22-23).

The emergent complexity idea leads us to realize that we should seek for more coherent traction between domains of knowledge; we need to be committed to synthesizing ideas whether they are scientific, religious, or philosophical. And we need to seek out their convergences. In this light, even the idea of a Deity sustaining and upholding constant universal laws can seem rational; predictability is what science is based upon after all. Clayton puts it this way, "On the one hand, the sciences suggest nature's self-sufficiency as a closed and coherent system; on the other, they hint at what we may credibly view as a transcendent source for nature. The idea of a transcendent source does not negate science, but it does undercut claims on behalf of science's self-sufficiency." This is *not* to say that there is a place in science for empirical 'proofs' of God or discovery of divine purpose. But science today is valuing emergent complexity theory especially when reduction to physicalist explanations seems lacking. The door is open once again to have several domains of knowledge interact.

How to get scripture, discoveries of nature, traditions of the Church, and one's own personal experiences to be consistent in discovering transcendence . . . that's the job of journals such as EJST. Now in its third year, this approach is one that I can appreciate as a Phi Beta Kappan: *philosophiā biou kubernētēs*. Studying three domains of knowledge – science, theology and philosophy – if they each are avenues for pursuing truth, then one would expect that they might synergistically reach Truth. Getting these three groups to interact is an initiative of the Templeton foundation from which many international scholars receive support. It was not always that way. At an international meeting of microbial ecologists in Brazil in 1992, I was stunned by a colleague who claimed that a Christian University was an anachronism and an oxymoron. On the flip side, my appreciation of the value of proper exegesis of allegorical scriptures garners disdain from fundamentalists who label me a functional atheist. I love science and I love Jesus. How does one exist in several arenas where scientific colleagues and brethren criticize?

First, one needs to see science as like a good card game. The game is called methodological naturalism. It is a great method to explain how and why things happen. At the card game of science, you only play naturalistic explanation cards to describe why things happen. Supernatural cards are trumps. No one trumps because the game ends when you do. The goal is to keep the game going; not to win. Some scientists want to win the game and so they make a false metaphysical leap and say that all there is in reality (not just in the game)

are naturalistic explanations. They allow metaphysical value statements to slip in under the guise of science.

Second, one has to explain to church goers that Divine agency is more complex than miracles in the Humean sense. After all, if God is the perfect law giver, then one would expect God to abide by those same perfect natural laws and not need to keep "fiddling with the dials" to get it right – no magical interventions needed. God needs to remain ineffable, mysterious and numinous. Trying to reduce divinity to an engineering intelligent designer or a magician takes away the mystery. One also has to explain that bible stories are complex and beyond superficial "plain-sense" meanings. Plain-sense meanings do not convey the depth about the human experience or about God. A metaphorical approach that seeks out the spiritual message does.

How to get God's revelations in harmony – revelation in scripture, in created nature, in the traditions of the church, and in one's own spiritual walk – perhaps is the work of the Holy Spirit. It is the work in which journals like EJST need to be involved . . . but we need to approach the job with humility and admit we may never know for sure. Voltaire's statement several centuries ago is still apropos: "It is truly extravagant to define God, angels and minds, and to know precisely why God defined the world, when we do not even know why we move our arms at will. Doubt is not a very agreeable state, but certainty is a ridiculous one." At the same time, we should be intrigued with St. Anselm's phrase *fides querens intellectum*. We may never fully understand in this lifetime. But we have the hope of an eternity to learn and accomplish the goal. As St. Paul said, "For now we see through a glass darkly; but then face to face. Now I know in part; but then shall I know even as also I am known." (1 Corinthians 13.12)

References

[1] P. Clayton, Theology and Science, 4 (2006) 291.

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